

Pre-Feasibility Study

GOLD JEWELRY MANUFACTURING AND RETAIL SHOP



Small and Medium Enterprises Development Authority

Ministry of Industries & Production

Government of Pakistan

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July 2015

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1 DISCLAIMER

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Document Control

Document No.	PREF-87
Revision	3
Prepared by	SMEDA-Punjab
Revision Date	July 2015
For information	Provincial Chief Punjab janjua@smeda.org.pk

2 EXECUTIVE SUMMARY

Gold jewelry is perceived not only as a decorative item but also as a symbol of status. In Pakistan, there is a great demand of gold jewelry among the women. Its demand specially increases to manifolds on weddings and people spend massive money on gold items. Another reason for the vitality of the gold jewelry market is that all domestic jewelry products are priced by weight, which results in the fact that people perceive gold jewelry as a means of security net for the future.

This particular pre-feasibility is intended to provide general information for initiating an integrated 'Gold Jewelry Manufacturing and Retailing Shop' business for potential investors. It is assumed that 20% of total jewelry items manufactured and sold will be the traditional items normally available in gold jewelry shop, while 80% of total jewelry items will be designer made, which is of premium quality and high priced. The ideal location for setting up the jewellery shop would be in main markets or shopping centres where more females tend to shop frequently.

The proposed 'Gold Jewelry Manufacturing and Retailing' business will have an installed capacity of producing different jewelry items (i.e. Rings, Earrings, Bangles, Necklaces, Bracelets, Chains, Bridal Sets and etc.,) of 3,705 tola's of gold per annum. However, initial operational capacity is assumed at 50% during first year with a gradual increase of 10% in subsequent years up to maximum capacity utilization of 80%. This production capacity is estimated to be economically viable and justifies the capital as well as operational costs of the project.

Total cost of setting up the proposed 'Gold Jewelry Manufacturing and Retailing Shop' is estimated at Rs. 6.91 million. The project is financed through 50% debt and 50% equity. The project NPV is around Rs. 27.65 million, with an IRR of 59% and payback period of 2.72 years. The legal business status of this project is proposed as 'Sole Proprietorship'.

3 INTRODUCTION TO SMEDA

The Small and Medium Enterprises Development Authority (SMEDA) was established in October 1998 with an objective to provide fresh impetus to the economy through development of Small and Medium Enterprises (SMEs).

With a mission "to assist in employment generation and value addition to the national income, through development of the SME sector, by helping increase the number, scale and competitiveness of SMEs", SMEDA has carried out 'sectoral

research' to identify policy, access to finance, business development services, strategic initiatives and institutional collaboration and networking initiatives.

Preparation and dissemination of prefeasibility studies in key areas of investment has been a successful hallmark of SME facilitation by SMEDA.

Concurrent to the prefeasibility studies, a broad spectrum of business development services is also offered to the SMEs by SMEDA. These services include identification of experts and consultants and delivery of need based capacity building programs of different types in addition to business guidance through help desk services.

4 PURPOSE OF THE DOCUMENT

The objective of the pre-feasibility study is primarily to facilitate potential entrepreneurs in project identification for investment. The project pre-feasibility may form the basis of an important investment decision and in order to serve this objective, the document/study covers various aspects of project concept development, start-up, and production, marketing, finance and business management.

The purpose of this document is to facilitate potential investors in '**Gold Jewelry Manufacturing and Retailing Shop**' business by providing them with a general understanding of the business with the intention of supporting potential investors in crucial investment decisions.

The need to come up with pre-feasibility reports for undocumented or minimally documented sectors attains greater imminence as the research that precedes such reports reveal certain thumb rules; best practices developed by existing enterprises by trial and error, and certain industrial norms that become a guiding source regarding various aspects of business set-up and its successful management.

Apart from carefully studying the whole document one must consider critical aspects provided later on, which form basis of any investment decision.

5 BRIEF DESCRIPTION OF PROJECT & PRODUCT

A lack of passion for gold jewelry in Pakistan, and even amongst the Pakistani expatriates, is hard to imagine. It is a cultural idiosyncrasy within the South Asian Region. Gold jewelry is perceived not only as a personal beautician ornament for females but a symbol of status as well. This perception pervades across all

classes in the society. The market for gold manufacturing and retailing in Pakistan has been developing steadily over the last decades but increasing population keep expanding the potential domestic markets. Additionally, gold price is considered to be outmatching inflation thus purchase of gold jewelry is more readily justified in terms of future security.

The proposed enterprise will comprise of an integrated gold jewelry manufacturing and retailing shop, which mainly targets to two broad categories of target market / clients (i.e. Traditional Designs and Designer Wear). It is proposed that 20% of total jewelry items manufactured and sold will be the traditional items, while rest of 80% items will be designer made. The designer made jewelry items will be sold at a premium price and mainly target the elite class customers. The business model in this report assumes traditional / mainstream customers who prefer 22 karat gold jewelry as the target market.

The proposed unit will mainly manufacture gold jewelry item according to the customer demand and requirements. However, in order to keep the project operational throughout the year, production of different varieties of jewelry items is planned according to the latest trend. The weight wise distribution of jewelry items to be produced and sold by the proposed venture is provided below:

Table 1: Product Mix According to Weights

Product Mix (Jewelry Items)	Item-wise Distribution of Gold Stock (%)	No of Units per Item Type given 4600 gms (400 tolas) of Gold
Earrings	4%	40
Rings	9%	108
Bangles' Design (four bangles per design)	14%	16
Bracelets	7%	24
Chains	3%	10
Necklaces	43%	56
Pendants	3%	42
Teeka	0%	2
Bridal Set	17%	12
Total	100%	310

5.1 Production Process Flow

The production process flow starts from obtaining an order from the customer. As the proposed venture comprises of its own manufacturing facility, therefore, orders obtained from customers in the retail shop are sent to production supervisor / lead craftsmen in the workshop.

Jewelry Designing

Before starting the manufacturing of items, designs are developed and get approved from the clients. The main sources of jewelry designs mainly includes:

- Copy of designs from jewelry magazines and catalogues
- New designs from the professional jewelry designers
- Provided by the clients

Once the jewelry design is provided to the craftsman / pattern maker, the latter makes a sketch of the design and shows it to the jeweler / entrepreneur for approval. This process till the approval may take about 2 days.

Gold Refining and Mixing

The jeweler commissioning the manufacturing of gold jewelry first purchases gold in the form of ingots from gold wholesalers in Sarafa bazaars. Afterward, the gold is mixed to get the desired karat. The mixed gold is molded into small bars and given to the craftsman who manufactures the order. If the jewelry design requires setting of gems / stones, they too will have to be bought. The quality of stones can be verified from the Gem Corporation.

Converting Gold Ingots into Gold Sheets and Wires

In accordance with the design requirements, the craftsman converts the gold ingots into gold sheets and wires as per thickness required by the design. The gold sheets and rods are made from a machine locally called sheet and wire making machine (Patra or Ari ki Machine). This machine compresses the gold fed into it in one end to produce sheets / wires according to the setting from the other end.

Transfer of Design / Pattern Making

There are two main ways a craftsman may transfer the design into a jewelry item:

- I. Direct transfer of design on Patra (flat gold sheet) by the “Engraver” locally referred to as “Ari ka Kaam Karrney Wala”.
- II. Casting method is used for repeated designs. Casting designs are those that are used currently either as piece in a jewelry item or a jewelry item itself. Generally, casting process is often outsourced by workshops to independent casting units in the jewelry cluster.

The direct transfer of design is a more popular method. The disadvantage of direct transfer of design on gold sheet is that one requires more gold than is required to

make an item. The excess gold at the end of the process is then melted and re-used in other items.

Engraving

Most jewelry designs often require engraving whereas intricate patterns are etched onto the gold base. Basic engraving may be done at the workshop. However, engraving is a specialized task, and sophisticated engraving may need to be outsourced to an independent engraver in the market.

Engraving mainly requires basic chip forming tools such as miniature chisels made of hardened steel. In proper engraving a sharpened tool is set against the metal at a specific angle and pressure is applied both inward and forward. The tool buries itself into the sheet, forms a chip, and pushes that curl of metal ahead of it as it cuts.

Finishing

Once the design has been transferred, engraved and design pieces are soldered to form one item, the craftsman gives the piece a finish technically called “deburring” before the item is sent for polishing. Deburring is the removal of all sharp edges, air bubbles and burrs on a piece.

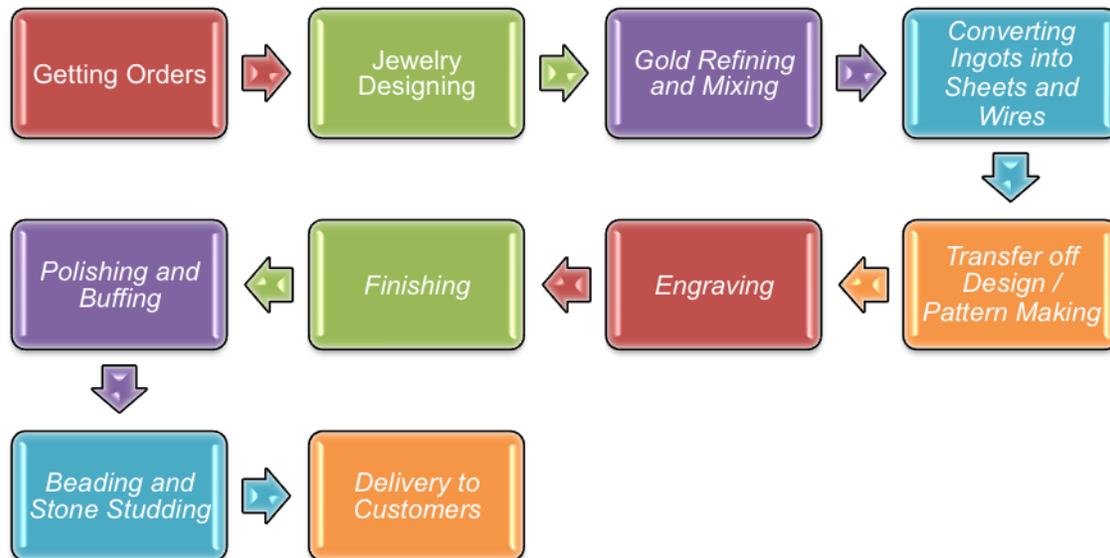
Polishing and Buffing

Polishing is the use of abrasives to get general surface finish improvement. Buffing is the step to get a smooth, bright, high luster final finish. This process may take one to three days depending on the item being polished and buffed.

Beading and Stone Studding

Beading and gem studding process occurs after the finishing, polishing and buffing of the main gold base of the jewelry item. Beading is the stringing of gem beads on to the main gold jewelry item. There is often a “beader” in every workshop whose job is only to put the beads on to the gold jewelry. Gem studding is fixing of gemstones on the jewelry.

Production Process Flow Diagram



5.2 Installed And Operational Capacities

The capacity of the workshop is defined as the volume of output the workshop can produce when working to full capacity at a given period of time. In this case, the capacity of the workshop is defined as the amount of gold jewelry in terms of grams (weight) that the workshop can produce in a year when working at its full capacity. The research, based on interviews with gold jewelry making craftsmen suggests that on average, a skilled craftsman can produce gold jewelry worth 575 grams of gold in a month or 6900 grams (600 tola's) worth of jewelry in a year.

Accordingly, on the basis of installed machinery and engaging 06 craftsmen the proposed production facility have an installed capacity of producing 3,705 tolas jewelry items per year. Capacity utilization during first year of operation is assumed to be at 50%, whereas capacity utilization growth rate for subsequently years will be considered 10%. The maximum capacity utilization is worked out at 80% in the 4th year of operation. This production capacity is estimated to be economically viable and justifies the capital as well as operational costs of the project.

The details of installed and operational capacities are provided in the table below:

Table 2: Installed and Operation Capacity (Workshop)

Product Categories	% Of Total Production	Annual Production Capacity (in tolas)	Year 1 - Operational Capacity 50 % (in tolas)	Maximum Capacity 80 % (in tolas)
Designer Wear Jewelry	80%	2,964	1,482	2,371.2
Traditional Jewelry	20%	741	370.5	592.8
Total	100%	3,705	1,852.5	2,964

On the other hand, the capacity of the gold jewelry retail shop is determined in terms of units sold and stocked for specific period of time. According to the estimates the proposed jewelry retail shop will operate on selling 95% of the stocks produced by the workshop, while 5% of the stocks will be utilized as finished goods inventory. Therefore, the proposed retail shop will be able to sell 1,775 grams of jewelry items during the first year of operation with 10% increase in sales in the subsequent years.

6 CRITICAL FACTORS

Following are the factors critical for the success of this business venture:

- ⇒ Selection of a good location for the outlet.
- ⇒ Ability to produce / acquire unique designs and safe guarding such designs from piracy.
- ⇒ Establishing a reputation of reliability (in terms of honest and timely processing of orders) and quality
- ⇒ Networking to identify suppliers and service providers who are reliable and provide adequate quality.
- ⇒ Quality of craftsmanship, managing turnover of craftsmen.
- ⇒ Efficient management of stock to keep inventory cost at the minimum.
- ⇒ Knowledge about the latest market trends.
- ⇒ Higher return on investment and a steady growth of business is expected with the entrepreneur having some prior experience in the related field of business.

- ⇒ Marketing and promotion through various channels i.e. catalogues / pamphlets, outdoor advertisement, hoardings / flex signs, TV & cable ads, fashion shows, participation in exhibitions, promotion through social media (Facebook, etc.).

7 GEOGRAPHICAL POTENTIAL FOR INVESTMENT

The ideal location for workshop would be within a jewelry cluster often referred to as Sirafa Bazaar in main urban cities. The advantage of locating the workshop in the main urban cities relate to the fact the cluster is almost self-sufficient in terms of supply of raw material, small tools and equipment , in addition to the networks and links developed with suppliers.

Proposed location for setting up the jewelry retail shop will be a commercial market or shopping centre of a major city across Pakistan that can offer easy access of customers to the outlet, especially females. It is further recommended that the proposed location should be taken on rent.

Considering to that, major cities for instance Karachi, Lahore, Peshawar, Quetta, Rawalpindi, Islamabad, Multan, Sialkot, Faisalabad, Hyderabad and etc., with large urban base would be the potential investment areas for the proposed business.

8 POTENTIAL TARGET CUSTOMERS / MARKETS

Target customers for the proposed project would be females of age 20 years and above, belonging to elite and middle-income family groups of urban cities stated above. However, potential target clients particularly for Designer Jewelry will be the elite class, who generally prefer to buy the jewelry with unique designs.

9 PROJECT COST SUMMARY

A detailed financial model has been developed to analyze the commercial viability of gold jewelry and retailing. Various costs and revenue related assumptions along with results of the analysis are outlined in this section.

The projected Income Statement, Cash Flow Statement and Balance Sheet are also attached as annexure.

9.1 Project Economics

All the figures in this financial model have been calculated for estimated sale of worth Rs. 86.33 million during the first year. Afterwards, 10% growth is expected in the subsequent years.

The following table shows internal rate of return, payback period and net present value of the proposed venture.

Table 3: Project Economics

Description	Details
Internal Rate of Return (IRR)	59%
Payback Period (yrs.)	2.72
Net Present Value (Rs.)	27,650,030

9.2 Project Financing

Following table provides details of the equity required and variables related to bank loan:

Table 4: Project Financing

Description	Details
Total Equity (50%)	3,456,356
Bank Loan (50%)	3,456,356
Interest Rate	14%
Tenure of the Loan (Years)	5

9.3 Project Cost

Following fixed and working capital requirements have been identified for operations of the proposed business.

Table 5: Project Cost

Description	Amount Rs.
Capital Cost	
Machinery & Equipment	430,000
Furniture & Fixture	990,000
Office Equipment	336,300

Pre-operating Cost	521,000
Security deposit	450,000
Total Capital Cost	2,727,300
Working Capital	
Equipment spare part inventory	5,918
Raw Material Inventory	3,029,495
Up-front Building Rent	450,000
Cash	700,000
Total Working Capital	4,185,413
Total Project Cost	6,912,713

9.4 Space Requirement

The area has been calculated on the basis of space requirement for jewelry manufacturing facility and retail outlet, which has to be taken on rent.

Table 6: Space Requirement

Space Requirement	Area in Sq. Ft.	Rent / Month (Rs.)
Jewelry Production Workshop	500	30,000
Designer Office	100	
Production Hall	300	
Store	100	
Retail Outlet	300	120,000
Total	800	150,000

The rent of the building will depend on the area and geographical location of the unit.

It is suggested that space for workshop may be acquired in the vicinity of “Sarafa Bazars” of big cities where skilled workers are easily available. While, rental space for retail shop is proposed to be ideally located in the commercial market or shopping malls.

9.5 Machinery & Equipment Requirement

Plant, machinery and equipment for the proposed project are stated below:

Table 7: Machinery & Equipment Requirement

Description	Quantity	Unit Cost (Rs.)	Total Cost (Rs.)
Wire Making Machine and Accessories	1	40,000	40,000
Plate Making Machine and Accessories	1	40,000	40,000
Wax Casting Machine & Equipment	1	175,000	175,000
Polishing Machine and Accessories	1	15,000	15,000
Tool Set for Craftsmen	5	20,000	100,000
Tools for Gem Studders	2	15,000	30,000
Digital Scale	2	15,000	30,000
Total	-	-	430,000

9.6 Furniture & Fixtures Requirement

Details of the furniture and fixture required for the project are given below:

Table 8: Furniture & Fixture Requirement

Description	Quantity	Unit Cost (Rs.)	Total Cost (Rs.)
Retail Outlet			
Counter Tables	1	40,000	40,000
Counter Chairs	4	15,000	60,000
Visitor Chairs	8	4,500	36,000
Renovation of Outlet	1	400,000	400,000
Air Conditioners (Split 1.5 tons)	2	55,000	110,000
Production Facility Workshop			
Safe	2	40,000	80,000
Office Tables / Chairs for Design Department	2	40,000	80,000
Work Station for Craftsmen	6	4,000	24,000
Chair for Workers	10	2,500	25,000

Tables for Workers with Lamps	10	7,000	70,000
Hand Tools (magnifying glass, gem inspection glass, ring size gauge .etc)	1	15,000	15,000
Electric Wiring & Lighting	1	50,000	50,000
Total			990,000

9.7 Office Equipment Requirement

Following office equipment will be required for gold manufacturing and retailing:

Table 9: Office Equipment Requirement

Description	Quantity	Unit Cost (Rs.)	Total Cost (Rs.)
Laptop	3	55,000	165,000
UPS with battery	1	26,800	26,800
Printer	2	20,000	40,000
Telephone	3	1,500	4,500
Generator	1	100,000	100,000
Total			336,300

9.8 Human Resource Requirement

Following table provides details of human resource required for the project along with monthly salaries:

Table 10: Human Resource Requirement

Description	No. of Employees	Monthly Salary per Person (Rs.)
Retail Unit		
Shop Manager	1	60,000
Sales Assistant	2	20,000
Shop Boy	1	12,000
Manufacturing Unit		
Designer	1	70,000
Assistant Designer	1	35,000

Chief Craftsman	1	40,000
Craftsmen	6	25,000
Beader	2	15,000
Studder	2	25,000
Polisher	2	18,000
Casting Machine Operator	1	20,000
Guard	2	15,000
Total		370,000

9.9 Raw Material Requirement

The main raw material required and their usage is listed below. The monthly requirement assessment for each raw material is based on the workshop operations at 308.75 tolas of gold jewelry.

Table 11: Raw Material Requirement

Raw material	Purpose
Casting Rubber	For making casting dyes for new design.
Whip Mix Powder (Plaster)	Required in the process of casting.
Nitric Acid	Required in the process of casting.
Surf / Detergent	Required during polishing and buffing process.
Coloring Chemical	Required to change color of gold jewelry item after finishing process.

9.10 Utilities and other costs

An essential cost to be borne by the business is the cost of electricity; a three-phase commercial electricity connection is required. The annual electricity and direct electricity expenses are estimated as Rs 288,000 and Rs. 457,200, respectively.. This project also requires marketing and promotional activities for which approximately 0.5% of total revenues will be spent on marketing and promotion expenses annually for the first three years.

Moreover some miscellaneous office expense occurs every year, which includes (Stationary expense, Tea and entertainment expense for loyal customers and employees, Commuting expense and other non-recurring expenses).

9.11 Revenue Generation

Revenue and cost assumptions of the proposed business venture during first year of operation will be:

Table 12: Revenue Generation - Year 1

Description	% of Production	Sales Price (Rs. per tola)	Production in Year 1	Sales Revenue (Rs)*
Designer Wear	80%	49,698	1,482	73,652,436
Traditional Wear	20%	44,373	370.5	16,444,196
Total	100%		1852.5	90,096,632

* It is the overall sales revenue that could be generated as per the estimates, however it is assumed that out of total production of Year-1, only 95% (i.e. Rs. 86.34 million as reflected in Income Statement attached as annexure) will be sold, whereas rest of the 5% will be the finished good inventory.

10 CONTACT DETAILS

In order to facilitate potential investors, contact details of private sector Service Providers relevant to the proposed project be given.

10.1 Machinery Suppliers

Name of Supplier	Location	Phone
Saqib Naeem	Lahore	0322-4149669
Gull Ahmed	Lahore	042-37676235
ABROX international	Sialkot	0321-6104352

10.2 Raw Material Suppliers

Raw Material	Location
Raw Material Suppliers	KB Laboratory, Rang Mahal Lahore

	(0322-4030630) KFB Laboratory, Old Anarkali Lahore (0323-7000082)
Gold	Sarafa Bazar – Karachi, Lahore, Rawalpindi and Peshawar
Casting Rubber	Old Anarkali Lahore and Sadar Bazar Karachi
Whip Mix Powder	Old Anarkali Lahore and Sadar Bazar Karachi
Coloring Chemical and Nitric Acid	Akbari Mandi and Papar Mandi, Lahore
Stones and Beads	Pearls, Gems Jeweler Center, Karachi

11 USEFUL WEB LINKS

Small & Medium Enterprises Development Authority (SMEDA)	www.smeda.org.pk
Government of Pakistan	www.pakistan.gov.pk
Ministry of Industries & Production	www.moip.gov.pk
Ministry of Education, Training & Standards in Higher Education	http://moptt.gov.pk
Government of Punjab	www.punjab.gov.pk
Government of Sindh	www.sindh.gov.pk
Government of Khyber Pakhtunkhwa	www.khyberpakhtunkhwa.gov.pk
Government of Balochistan	www.balochistan.gov.pk
Government of Gilgit Baltistan	www.gilgitbaltistan.gov.pk
Government of Azad Jamu Kashmir	www.ajk.gov.pk
Trade Development Authority of Pakistan (TDAP)	www.tdap.gov.pk
Security Commission of Pakistan (SECP)	www.secp.gov.pk
Federation of Pakistan Chambers of Commerce and Industry (FPCCI)	www.fpcci.com.pk
State Bank of Pakistan (SBP)	www.sbp.org.pk
Punjab Small Industries Corporation	www.psic.gov.pk

Sindh Small Industries Corporation	www.ssic.gos.pk
Pakistan Horticulture Development and Export Company (PHDEC)	www.phdec.org.pk
Punjab Vocational Training Council (PVTC)	www.pvtc.gop.pk
Technical Education and Vocational Training Authority (TEVTA)	www.tevta.org
Punjab Industrial Estates (PIE)	www.pie.com.pk
Faisalabad Industrial Estate Development and Management Company (FIEDMC)	www.fiedmc.com.pk
Pakistan Gems & Jew Development Company	www.pigje.com.pk
Pakistan School of Fashion Designing	www.pifd.edu.pk
National College Of Arts	www.nca.edu.pk
Gems and Jewellery Training Institute	www.education.org

12 ANNEXURES

12.1 Income Statement

Calculations										SMEDA
Income Statement										
	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6	Year 7	Year 8	Year 9	Year 10
	Rs. in actuals									
Revenue	86,337,877	118,095,201	151,706,912	190,860,013	211,045,208	232,149,729	255,364,701	280,901,172	308,991,289	339,890,418
<i>Cost of sales</i>										
Cost of goods sold 1	72,707,880	99,451,735	127,757,229	160,729,304	177,727,901	195,500,691	215,050,760	236,555,836	260,211,420	286,232,562
Operation costs 1 (direct labor)	3,921,500	4,469,942	4,921,848	5,418,085	5,991,097	6,590,207	7,249,228	7,974,150	8,771,565	9,648,722
Operating costs 2 (machinery maintenance)	35,506	48,566	62,389	78,490	86,791	95,470	105,017	115,519	127,071	139,778
Operating costs 3 (direct electricity)	457,200	502,920	553,212	608,533	669,387	736,325	809,958	890,953	980,049	1,078,054
Total cost of sales	77,122,086	104,473,163	133,294,678	166,834,413	184,475,176	202,922,693	223,214,963	245,536,459	270,090,105	297,099,115
Gross Profit	9,215,791	13,622,038	18,412,234	24,025,600	26,570,032	29,227,035	32,149,739	35,364,713	38,901,184	42,791,302
<i>General administration & selling expenses</i>										
Administration expense	2,784,000	3,062,400	3,368,640	3,705,504	4,076,054	4,483,660	4,932,026	5,425,228	5,967,751	6,564,526
Administration benefits expense	83,520	91,872	101,059	111,165	122,282	134,510	147,961	162,757	179,033	196,936
Building rental expense	1,800,000	1,980,000	2,178,000	2,395,800	2,635,380	2,898,918	3,188,810	3,507,691	3,858,460	4,244,306
Electricity expense	288,000	316,800	348,480	383,328	421,661	463,827	510,210	561,231	617,354	679,089
Travelling expense	139,200	153,120	168,432	185,275	203,803	224,183	246,601	271,261	298,388	328,226
Communications expense (phone, fax, mail, internet, etc.)	208,800	229,680	252,648	277,913	305,704	336,274	369,902	406,892	447,581	492,339
Office expenses (stationary, entertainment, janitorial services, etc.)	278,400	306,240	336,864	370,550	407,605	448,366	493,203	542,523	596,775	656,453
Promotional expense	431,689	474,858	522,344	574,579	632,036	695,240	764,764	841,240	925,365	1,017,901
Depreciation expense	175,630	175,630	175,630	175,630	175,630	175,630	175,630	175,630	175,630	175,630
Amortization of pre-operating costs	104,200	104,200	104,200	104,200	104,200	-	-	-	-	-
Subtotal	6,293,439	6,894,800	7,556,297	8,283,944	9,084,356	9,860,608	10,829,106	11,894,453	13,066,336	14,355,406
Operating Income	2,922,352	6,727,237	10,855,937	15,741,656	17,485,677	19,366,427	21,320,633	23,470,259	25,834,848	28,435,896
Earnings Before Interest & Taxes	2,922,352	6,727,237	10,855,937	15,741,656	17,485,677	19,366,427	21,320,633	23,470,259	25,834,848	28,435,896
Interest on short term debt	33,669	33,669	-	-	-	-	-	-	-	-
Interest expense on long term debt (Project Loan)	180,546	150,563	116,157	76,674	31,367	-	-	-	-	-
Interest expense on long term debt (Working Capital Loan)	273,538	227,124	173,780	112,468	42,000	-	-	-	-	-
Subtotal	487,753	411,356	289,936	189,142	73,368	-	-	-	-	-
Earnings Before Tax	2,434,599	6,315,881	10,566,001	15,552,513	17,412,309	19,366,427	21,320,633	23,470,259	25,834,848	28,435,896
Tax	334,420	1,433,058	2,920,599	4,665,879	5,316,807	6,000,749	6,684,721	7,437,090	8,264,696	9,175,063
NET PROFIT/(LOSS) AFTER TAX	2,100,179	4,882,823	7,645,401	10,886,634	12,095,501	13,365,678	14,635,912	16,033,169	17,570,152	19,260,833

12.2 Balance Sheet

Calculations											SMEDA
Balance Sheet											
	Year 0	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6	Year 7	Year 8	Year 9	Year 10
	Rs. in actuals										
Assets											
<i>Current assets</i>											
Cash & Bank	700,000	-	2,216,478	6,535,399	14,458,919	23,223,042	33,723,675	44,911,517	56,783,952	69,335,878	116,219,247
Accounts receivable		1,655,795	1,960,317	2,587,144	3,284,888	3,853,886	4,249,814	4,674,796	5,142,275	5,656,503	6,222,153
Finished goods inventory		3,353,134	4,383,489	5,587,202	6,987,829	7,686,466	8,455,112	9,300,623	10,230,686	11,253,754	12,379,130
Equipment spare part inventory	5,918	8,904	12,582	17,412	21,179	25,626	31,007	37,519	45,398	54,932	-
Raw material inventory	3,029,495	4,558,205	6,441,094	8,913,779	10,842,142	13,118,992	15,873,981	19,207,517	23,241,095	28,121,725	-
Pre-paid building rent	450,000	495,000	544,500	598,950	658,845	724,730	797,202	876,923	964,615	1,061,076	-
Total Current Assets	4,185,413	10,071,037	15,558,460	24,239,885	36,253,803	48,632,741	63,130,793	79,008,894	96,408,021	115,483,869	134,820,530
<i>Fixed assets</i>											
Security Deposit	450,000	450,000	450,000	450,000	450,000	450,000	450,000	450,000	450,000	450,000	450,000
Machinery & equipment	430,000	387,000	344,000	301,000	258,000	215,000	172,000	129,000	86,000	43,000	-
Furniture & fixtures	990,000	891,000	792,000	693,000	594,000	495,000	396,000	297,000	198,000	99,000	-
Office equipment	336,300	302,670	269,040	235,410	201,780	168,150	134,520	100,890	67,260	33,630	-
Total Fixed Assets	2,206,300	2,030,670	1,855,040	1,679,410	1,503,780	1,328,150	1,152,520	976,890	801,260	625,630	450,000
<i>Intangible assets</i>											
Pre-operation costs	521,000	416,800	312,600	208,400	104,200	-	-	-	-	-	-
Total Intangible Assets	521,000	416,800	312,600	208,400	104,200	-	-	-	-	-	-
TOTAL ASSETS	6,912,713	12,518,507	17,726,100	26,127,695	37,861,783	49,960,891	64,283,313	79,985,784	97,209,281	116,109,499	135,270,530
Liabilities & Shareholders' Equity											
<i>Current liabilities</i>											
Accounts payable		3,600,763	4,934,843	6,369,216	7,995,641	8,893,995	9,850,738	10,917,298	12,107,626	13,437,692	13,337,890
Short term debt	-	418,883	-	-	-	-	-	-	-	-	-
Total Current Liabilities	-	4,019,646	4,934,843	6,369,216	7,995,641	8,893,995	9,850,738	10,917,298	12,107,626	13,437,692	13,337,890
<i>Other liabilities</i>											
Long term debt (Project Loan)	1,363,650	1,160,405	927,176	659,541	352,424	-	-	-	-	-	-
Long term debt (Working Capital Loan)	2,092,706	1,781,921	1,424,722	1,014,178	542,323	-	-	-	-	-	-
Total Long Term Liabilities	3,456,356	2,942,326	2,351,898	1,673,720	894,747	-	-	-	-	-	-
<i>Shareholders' equity</i>											
Paid-up capital	3,456,356	3,456,356	3,456,356	3,456,356	3,456,356	3,456,356	3,456,356	3,456,356	3,456,356	3,456,356	3,456,356
Retained earnings		2,100,179	6,983,003	14,628,404	25,515,038	37,610,539	50,976,218	65,612,130	81,645,299	99,215,451	118,476,284
Total Equity	3,456,356	5,556,535	10,439,359	18,084,760	28,971,394	41,066,896	54,432,574	69,068,486	85,101,655	102,671,807	121,932,640
TOTAL CAPITAL AND LIABILITIES	6,912,713	12,518,507	17,726,100	26,127,695	37,861,783	49,960,891	64,283,313	79,985,784	97,209,281	116,109,499	135,270,530

12.3 Cash Flow Statement

Cash Flow Statement											Rs. in actuals
	Year 0	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6	Year 7	Year 8	Year 9	Year 10
<i>Operating activities</i>											
Net profit		2,100,179	4,882,823	7,645,401	10,886,634	12,095,501	13,365,678	14,635,912	16,033,169	17,570,152	19,260,833
Add: depreciation expense		175,630	175,630	175,630	175,630	175,630	175,630	175,630	175,630	175,630	175,630
amortization of pre-operating costs		104,200	104,200	104,200	104,200	104,200	-	-	-	-	-
Accounts receivable		(1,655,795)	(304,522)	(626,826)	(697,745)	(568,997)	(395,929)	(424,981)	(467,480)	(514,228)	(565,650)
Finished goods inventory		(3,353,134)	(1,030,355)	(1,203,713)	(1,400,627)	(698,637)	(768,647)	(845,511)	(930,062)	(1,023,069)	(1,125,375)
Equipment inventory	(5,918)	(2,986)	(3,678)	(4,830)	(3,767)	(4,447)	(5,381)	(6,512)	(7,879)	(9,534)	54,932
Raw material inventory	(3,029,495)	(1,528,710)	(1,882,889)	(2,472,686)	(1,928,363)	(2,276,850)	(2,754,988)	(3,333,536)	(4,033,579)	(4,880,630)	28,121,725
Pre-paid building rent	(450,000)	(45,000)	(49,500)	(54,450)	(59,895)	(65,885)	(72,473)	(79,720)	(87,692)	(96,461)	1,061,076
Accounts payable		3,600,763	1,334,080	1,434,373	1,626,425	898,354	956,743	1,066,560	1,190,328	1,330,066	(99,802)
Cash provided by operations	(3,485,413)	(604,853)	3,225,789	4,997,099	8,702,493	9,658,870	10,500,633	11,187,841	11,872,435	12,551,927	46,883,369
<i>Financing activities</i>											
Project Loan - principal repayment		(203,245)	(233,228)	(267,635)	(307,117)	(352,424)	-	-	-	-	-
Working Capital Loan - principal repayment		(310,786)	(357,199)	(410,544)	(471,855)	(542,323)	-	-	-	-	-
Short term debt principal repayment		-	(418,883)	-	-	-	-	-	-	-	-
Additions to Project Loan	1,363,650	-	-	-	-	-	-	-	-	-	-
Additions to Working Capital Loan	2,092,706	-	-	-	-	-	-	-	-	-	-
Issuance of shares	3,456,356	-	-	-	-	-	-	-	-	-	-
Purchase of (treasury) shares											
Cash provided by / (used for) financing activities	6,912,713	(514,031)	(1,009,311)	(678,179)	(778,972)	(894,747)	-	-	-	-	-
<i>Investing activities</i>											
Capital expenditure	(2,727,300)	-	-	-	-	-	-	-	-	-	-
Acquisitions											
Cash (used for) / provided by investing activities	(2,727,300)	-	-	-	-	-	-	-	-	-	-
NET CASH	700,000	(1,118,883)	2,216,478	4,318,921	7,923,521	8,764,122	10,500,633	11,187,841	11,872,435	12,551,927	46,883,369

13 KEY ASSUMPTIONS

13.1 Operating Cost Assumptions

Description	Details
Administration Benefit Expenses	3% of Administration Expenses
Communication Expenses	7.5% of Administration Expenses
Office Expenses	10% of Administration Expenses
Promotional Expenses (Year 1-3)	0.5% of Revenues
Depreciation Method	Straight Line
Depreciation Rate	10% on Furniture & Fixtures 10% on Office Equipment
Operating Cost Growth Rate	10%

13.2 Revenue Assumptions

Description	Details
Growth in Sales Price	10%
Day Operational / Year	330
Production Capacity in First Year	50%
Percentage Increase in Production Capacity Every Year	5%
Maximum Production Capacity	80%

13.3 Production Cost Assumption

Description	Details
Average Purchase Price per Tola	Rs. 40,355
Making per Tola	Rs. 2,000
Wastage	5%
Designer Premium	12 %
Profit Margin	10%

13.4 Financial Assumptions

Description	Details
Debt	50%
Equity	50%
Interest Rate on Debt	14%
Debt Tenure	5 years
Debt Payment/year	4